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OSMORHIZA GEOHINTONII (APIACEAE), A NEW SPECIES FROM NUEVO LEÓN, MEXICO

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ABSTRACT

A new taxon, **Ozmorhiza geohintonii** B.L. Turner, sp. nov., is described from southern Nuevo León, Mexico. It is similar and apparently closely related to the widespread *O. mexicana* but is readily distinguished by a number of features including petal color, fruit shape and ornamentation, style length, and leaf glabrosity. A photograph of the type is provided, along with maps showing the distribution of the taxa concerned.

KEY WORDS: Apiaceae, *Osmorhiza*, Mexico, Nuevo León

Routine identification of Mexican plants has revealed the following novelty.

OSMORHIZA GEOHINTONII B.L. Turner, sp. nov., Figs. 1, 2.

Osmorhiza bipatriata Constance & Shan similis sed foliis glabris (vs. pubescentibus), petalis flavis (vs. albis), fructibus valde ornatis costis flavis elevatis (vs. laevibus nitidis sine costis elevatis), et ramis styli (stylopodio incluso) plerumque ca. 1.5 mm in longitudine (vs. 1 mm in longitudine vel brevioribus).

TYPE: **MEXICO.** Nuevo León. Mpio. Zaragoza, Cerro El Viejo, 2050 m, scattered plants, 0.5 m, 7 Jul 2007, *Hinton et al. 22116* (holotype: TEX). Fig. 1.

Perennial herbs, 40–50 cm high, glabrous. **Leaves** mostly basal, 10–15 cm long, 6–10 cm wide, bipinnately dissected, glabrous, the serrations acute at apices; petioles 4–8 cm long. **Flowers** 10–20, borne in terminal umbels, primary peduncles 8–16 cm long, secondary peduncles mostly 5, 3–5 cm long. **Pedicels,** glabrous, 2–3 mm long. **Petals** 5, obovate, ca 1 mm long, reportedly "yellow." **Anthers,** ca 0.5 mm long. **Style branches** (including stylopodium), ca 1.5 mm long, separate to base. **Fruits** linear to clavate, ca 1.5 cm long, 3–4 mm wide, not tapered at base (as in *O. mexicana*), espiculate, markedly ornate with raised yellow ribs, not at all glossy or shellacked (as in *O. bipatriata*).

ADDITIONAL SPECIMEN EXAMINED: **MEXICO.** Nuevo León. [Mpio. Zaragoza], below San Josecito, 2485 m, oak woods, 40 cm, thin colony, fl yellow, 31 Jul 1999, *Hinton et al. 27390* (TEX). Label data place this collection as from [Mpio.] "Aramberri," but the village of San Josecito is in Mpio. Zaragoza. George Hinton, after reading an advanced copy of this paper, confirmed my observations, but added this: "When my father and I went to Cerro Viejo I had no GPS so I had but a vague idea of where the collection was made. When I collected GBH 27390 I did have a GPS: 23° 55′ 40″ N, 99° 57′ 49.3″ W. It is very close to where I collected the types for *Verbesina tamanuevana*, *Gibasis hintoniorum*, and *Satureja hintoniorum*, and about 7.5 km from the type of *Acourtia hintoniorum*. A good place to collect!"

The holotype was annotated as *Osmorhiza mexicana* subsp. *bipatriata* (Constance & Shan) Lowry & Jones by Lincoln Constance in 1992-95 and as *O. bipatriata* Constance & Shan by James

Henrickson in 2005. The distinctions between these taxa, including *O. geohintonii* and *O. mexicana* Griseb., are outlined in the following key.

1. Fruits tapering to the base, the bodies to some extent spiculate ..... **Osmorhiza mexicana**
1. Fruits not tapering basally, spicules absent.

2. Petals white; styles (including stylopodium) 0.5–0.8 mm long; leaves to some extent pubescent ..... **Osmorhiza bipatriata**
2. Petals yellow; styles (including stylopodium) ca 1.5 mm long; leaves glabrous ..... **Osmorhiza geohintonii**

Constance and Shan (1948) first recognized *Osmorhiza bipatriata* at specific rank, typified by material from the Davis Mountains in trans-Pecos Texas; the taxon was subsequently treated as *O. mexicana* subsp. *bipatriata* by Lowry and Jones (1985). Wen et al. (2004), drawing upon DNA data, accepted its specific status, noting its relationship to be closer to *O. depauperata* Phil. as first noted by Yoo et al. (2002), who observed that *O. mexicana* and *O. bipatriata* do not form a monophyletic group.

Lowry and Jones (1985) cited four specimens of *Osmorhiza* subsp. *bipatriata* as occurring in Nuevo León on Cerro Potosí at relatively high elevations, two of these (*Mueller 2231* and *Schneider 1108*) thought to be "intermediate between *O. mexicana* subsp. *mexicana* and subsp. *bipatriata*." I take all of these Cerro Potosí collections to be specimens of *O. mexicana*, the specimens concerned bearing nearly espiculate fruits, although they otherwise fit well within the fabric of *O. mexicana*.

Distribution of the taxa is shown in Fig. 2, based upon specimens at LL-TEX and those cited in the paper by Lowry and Jones (1985).

ACKNOWLEDGEMENTS

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TEX
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HOLOTYPE OF: Ozmorhiza geohintonii B.L.Turner
2011
HERBARIUM OF THE UNIVERSITY OF CALIFORNIA, BERKELEY
22116 Umbelliferae
Osmorhiza mexicana Griseb.
subsp. bipatriata (Const. & Shan) Lowry & Jones
Lincoln Constance, 1992-95
HERBARIUM OF G. B. HINTON NO. 22116
Collected by Hinton et al. 92/07/07
Determined by:
Locality: Cerro El Viejo. 2050 m.
Municipality: Zaragoza, N. L., Mexico.
Habitat: Oak and pine woods.
Description: Scattered plants. 0.5 m.
The University of Texas Herbarium (TEX)
Ozmorhiza geohintonii B.L. Turner
Det. B. L. Turner 2010
The University of Texas Herbaria, TEX-LL
Osmorhiza bipatriata Constance & R.H. Shan
Henrickson 2005
University of Texas - Austin (LL, TEX)
00163201

Figure 1. *Osmorhiza geohintonii* (holotype: TEX).

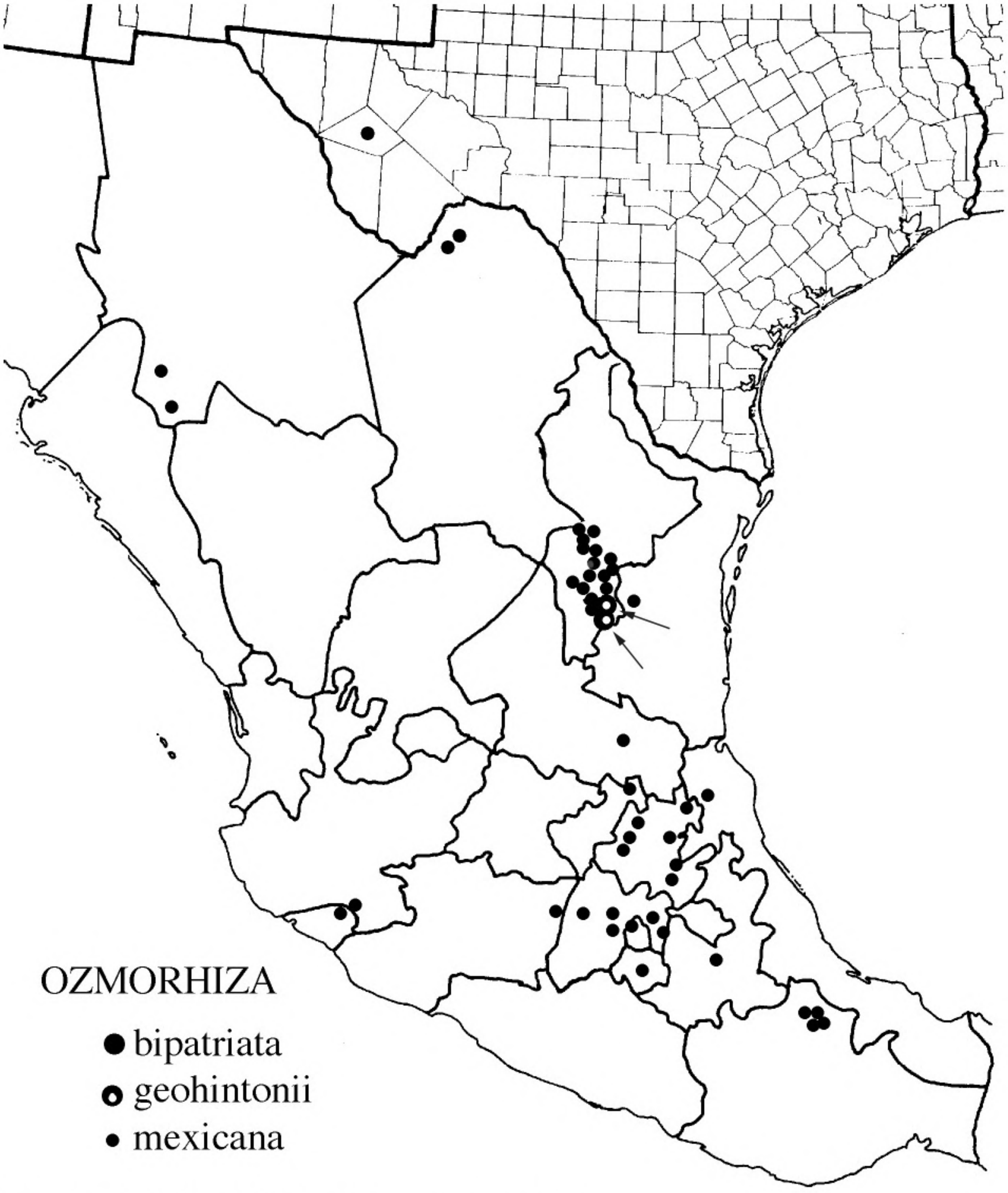

Figure 2. Distribution of the *Ozmorhiza mexicana* complex.